

BEFORE THE PUBLIC UTILITIES COMMISSION  
OF THE STATE OF HAWAII

In the Matter of the Application of)

PUBLIC UTILITIES COMMISSION )

DOCKET NO. 2014-0192

Instituting a Proceeding to )  
Investigate Distributed Energy )  
Resource Policies. )

ORDER NO. 35563

ADDRESSING: (1) THE HAWAIIAN ELECTRIC COMPANIES' RULE 24  
(CUSTOMER GRID SUPPLY PLUS) AND RULE 25 (SMART EXPORT) TARIFF  
SHEETS FILED APRIL 30, 2018; (2) THE HAWAIIAN ELECTRIC  
COMPANIES' CUSTOMER GRID SUPPLY PLUS TARIFF SHEET COMPLIANCE  
FILING FILED MAY 31, 2018; (3) THE HAWAIIAN ELECTRIC COMPANIES'  
PROPOSED POLICY AND PROCEDURE FOR ADDING TO NEM SYSTEMS FILED  
MARCH 9, 2018; (4) MOTION TO REAFFIRM AND ENFORCE  
COMMISSION-APPROVED INTERCONNECTION AND QUEUING POLICY REGARDING  
MODIFICATIONS TO DER SYSTEM SIZE FILED APRIL 9, 2018;  
AND (5) THE PROCEDURAL SCHEDULE GOVERNING THE MARKET TRACK

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PUBLIC UTILITIES COMMISSION	)	Docket No. 2014-0192
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Instituting a Proceeding	)	Order No. <b>35563</b>
to Investigate Distributed	)	
Energy Resource Policies.	)	
_____	)	

ADDRESSING: (1) THE HAWAIIAN ELECTRIC COMPANIES' RULE 24 (CUSTOMER GRID SUPPLY PLUS) AND RULE 25 (SMART EXPORT) TARIFF SHEETS FILED APRIL 30, 2018; (2) THE HAWAIIAN ELECTRIC COMPANIES' CUSTOMER GRID SUPPLY PLUS TARIFF SHEET COMPLIANCE FILING FILED MAY 31, 2018; (3) THE HAWAIIAN ELECTRIC COMPANIES' PROPOSED POLICY AND PROCEDURE FOR ADDING TO NEM SYSTEMS FILED MARCH 9, 2018; (4) MOTION TO REAFFIRM AND ENFORCE COMMISSION-APPROVED INTERCONNECTION AND QUEUING POLICY REGARDING MODIFICATIONS TO DER SYSTEM SIZE FILED APRIL 9, 2018; AND (5) THE PROCEDURAL SCHEDULE GOVERNING THE MARKET TRACK

By this Order,<sup>1</sup> the commission addresses a number of outstanding issues in this docket, including:

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<sup>1</sup>The Parties to this proceeding are HAWAIIAN ELECTRIC COMPANY, INC. ("HECO"), HAWAII ELECTRIC LIGHT COMPANY, INC. ("HELCO"), MAUI ELECTRIC COMPANY, LIMITED ("MECO") (collectively, HECO, HELCO, and MECO are referred to as the "HECO Companies"), KAUAI ISLAND UTILITY COOPERATIVE ("KIUC"), and the DEPARTMENT OF COMMERCE AND CONSUMER AFFAIRS, DIVISION OF CONSUMER ADVOCACY (the "Consumer Advocate"), an ex officio party, pursuant to Hawaii Revised Statutes § 269-51 and Hawaii Administrative Rules ("HAR") § 6-61-62(a).

Additionally, the commission has granted intervenor status to the DEPARTMENT OF BUSINESS, ECONOMIC DEVELOPMENT, AND TOURISM ("DBEDT"), HAWAII SOLAR ENERGY ASSOCIATION ("HSEA"), RENEWABLE ENERGY ACTION COALITION OF HAWAII ("REACH"), HAWAII PV COALITION

(1) the HECO Companies' Rule 25 (Smart Export)("SE") tariff sheets, filed April 30, 2018; (2) the HECO Companies' Rule 25 (Customer Grid Supply Plus)("CGS+") tariff sheets, filed April 30, 2018;<sup>2</sup> (3) the HECO Companies CGS+ tariff sheet compliance filing, filed May 31, 2018;<sup>3</sup> (4) the HECO Companies' on-going revisions to its policy and procedure for allowing customers with Net Energy Metering ("NEM") systems to add non-export energy storage systems;<sup>4</sup> and (5) the Joint Parties'<sup>5</sup>

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("HPVC"), BLUE PLANET FOUNDATION ("Blue Planet"), THE ALLIANCE FOR SOLAR CHOICE ("TASC"), SUNPOWER CORPORATION ("SunPower"), LIFE OF THE LAND ("LOL"), RON HOOSON ("Mr. Hooson"), the DISTRIBUTED ENERGY RESOURCE COUNCIL OF HAWAII ("DERC"), APOLLO ENERGY CORPORATION ("Apollo"), PUNA PONO ALLIANCE ("Puna Pono"), ULUPONO INITIATIVE LLC ("Ulupono"), and the ENERGY FREEDOM COALITION OF AMERICA, LLC ("EFCA").

<sup>2</sup>"Hawaiian Electric Companies' Compliance Filing; Rule 24 (Customer Grid Supply Plus) and Rule 25 (Smart Export) Tariffs and Appendix I," filed April 30, 2018 ("April CGS+ Tariff" and "April SE Tariff," respectively).

<sup>3</sup>Letter From: K. Katsura To: Commission Re: Docket No. 2014-0192 - Instituting a Proceeding to Investigate Distributed Energy Resource Policies; Hawaiian Electric Companies - Compliance Filing; Customer Grid Supply Plus Tariff Sheet; Aggregator Requirements, filed May 31, 2018 ("HECO May CGS+ Compliance Filing").

<sup>4</sup>See Letter From: D. Brown To: Commission Re: Docket No. 2014-0192 - Instituting a Proceeding to Investigate Distributed Energy Resource Policies; Revised Proposed Policy and Procedure for Adding to NEM Systems, filed March 9, 2018 ("Revised NEM Policy Proposal").

<sup>5</sup>The "Joint Parties" refers collectively to Blue Planet, HPVC, HSEA, LOL, PPA, Mr. Hooson, SunPower, and TASC.

Motion to Reaffirm, filed April 9, 2018.<sup>6</sup> In addition, the commission modifies the procedural schedule governing the Market Track of this proceeding, currently set forth in Order No. 34206.<sup>7</sup>

Specifically, the commission addresses the above issues by:

(1) Approving the HECO Companies' proposed revisions to the Rule 25 tariff as reflected in the April SE Tariff;

(2) Inviting the Parties to comment on HECO's May CGS+ Compliance Filing;

(3) Approving, with modifications, the HECO Companies' Revised NEM Policy Proposal;

(4) Addressing the Joint Parties' Motion to Reaffirm by: (A) clarifying that the HECO Companies should apply the "1 Kw Rule" to customers who have already submitted applications for the Customer Grid Supply ("CGS") or Customer Self Supply ("CSS") programs, as well as for CGS+ and SE customers, as applicable; and (B) instructing the HECO Companies to work with

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<sup>6</sup>"Motion to Reaffirm and Enforce Commission-Approved Interconnection and Queuing Policy Regarding Modifications to DER System Size; Memorandum in Support of Motion; Affidavit of William Giese; Attachment A; and Certificate of Service," filed April 9, 2018 ("Motion to Reaffirm").

<sup>7</sup>See Order No. 34206, "Establishing Statement of Issues and Procedural Schedule for Phase 2," filed December 9, 2016 ("Order No. 34206"), at 11-12.

stakeholders to develop tariff language to explicitly clarify the treatment and tolerance level for modifications to interconnection applications for the CSS, CGS+, and SE programs on a going forward basis; and

(5) Modifying the procedural schedule by suspending the deadlines set forth in Order No. 34206, pending further instructions in a subsequent commission Order.

## I.

### BACKGROUND

On October 20, 2017, the commission issued Decision and Order No. 34924 ("D&O 34924"), which addressed the "Technical Track" issues (Issue Nos. 3 and 4), as well as components of "Priority" issues (Issue Nos. 1 and 2), as set forth in the statement of issues in Order No. 34206.<sup>8</sup> In pertinent part, D&O 34924: (1) approved new opt-in DER tariffs (CGS+ and SE); and (2) approved the proposal to allow NEM customers to install energy storage and non-exporting generating systems without jeopardizing their enrollment in the NEM program.<sup>9</sup>

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<sup>8</sup>See Decision and Order No. 34924, filed October 20, 2017; and Order No. 34206 at 7-8.

<sup>9</sup>See D&O 34924 at 111-16, 139-49, 174-75, and 180-85.

The HECO Companies were instructed to submit their proposed policy and procedure for allowing NEM customers to add non-export technology within thirty days of D&O 34924.<sup>10</sup> In addition, the HECO Companies were instructed to file proposed tariffs for the CGS+ and SE programs within sixty (60) days of D&O 34924.<sup>11</sup>

On November 21, 2017, the HECO Companies filed their proposed policy and procedure for allowing NEM customers to add non-export technology, consistent with D&O 34924.<sup>12</sup> On December 19, 2017, the HECO Companies filed their proposed tariffs for Rules 24 and 25.<sup>13</sup>

On December 22, 2017, the commission invited the Parties to submit comments on the HECO Companies' NEM Policy Proposal, Proposed CGS+ Tariff, and Proposed SE Tariff.<sup>14</sup> Comments were

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<sup>10</sup>See D&O 34924 at 192.

<sup>11</sup>See D&O 34924 at 191-93.

<sup>12</sup>Letter From: D. Brown To: Commission Re: Docket No. 2014-0192 - Instituting a Proceeding to Investigate Distributed Energy Resource Policies; Proposed Policy and Procedure for Adding to NEM Systems," filed November 21, 2017 ("NEM Policy Proposal").

<sup>13</sup>Letter From: D. Brown To: Commission Re: Docket No. 2014-0192 - Instituting a Proceeding to Investigate Distributed Energy Resource Policies; Hawaiian Electric Companies - Compliance Filing; Customer Grid Supply Plus and Smart Export Tariff Sheets, filed December 19, 2017 ("Proposed CGS+ Tariff" and "Proposed SE Tariff," respectively).

<sup>14</sup>See Letter From: Commission To: Service List Re: Comments to HECO's DER Filings - Docket No. 2014-0192; In re Public Utilities

subsequently filed by DERC, EFCA, the Consumer Advocate, and a collection of solar industry and non-profit Parties.<sup>15</sup>

On February 5, 2018, the commission issued Order No. 35266, which, in relevant part: (1) approved, with modifications, the HECO Companies' Proposed CGS+ and SE Tariffs; and (2) instructed the HECO Companies to collaborate further with stakeholders and submit a revised proposed policy and procedure for allowing NEM customers to add non-export technology.<sup>16</sup> Regarding Rule 24, the commission found, in relevant part:

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Commission, Instituting a Proceeding to Investigate Distributed Energy Resource Policies, filed December 22, 2017.

<sup>15</sup>See "Distributed Energy Resources Council of Hawaii's Comments on HECO's DER Filings; and Certificate of Service," filed January 5, 2018 ("DERC DER Comments"); "Energy Freedom Coalition of America, LLC's Comments on HECO's Filings Relating to Policy and Procedures for Adding Non-Exporting Facilities to an Existing NEM System; HECO's Proposed Revisions to Rule 14H, 22 and 23; and HECO's Proposed Customer Grid Supply Plus and Smart Export Tariff; and Certificate of Service," filed January 8, 2018 ("EFCA DER Comments"); Letter From: Consumer Advocate To: Commission Re: Docket No. 2014-0192 - In the Matter of Public Utilities Commission Institute a Proceeding to Investigate Distributed Energy Resource Policies, filed January 8, 2018 ("CA DER Comments"); and "Blue Planet Foundation's, Hawaii PV Coalition's, Hawaii Solar Energy Association's, Ron Hooson's, Life of the Land's, Puna Pono Alliance's, and The Alliance for Solar Choice's Comments on the HECO Companies' Filings; and Certificate of Service," filed January 8, 2018 ("Joint DER Comments").

<sup>16</sup>See Order No. 35266, "Addressing Hawaiian Electric Company, Inc., Hawaii Electric Light Company, Inc., and Maui Electric Company, Limited's Proposed Tariffs Filed Pursuant to Decision and Order No. 34924," filed February 5, 2018 ("Order No. 35266"), at 2.



[I]nformation about the requirements for a third-party aggregator should be included in the tariff. The Joint Parties note that under the HECO Companies' proposal, such information would be published by the utility, at its discretion, on its website. The commission agrees that providing information on the technical requirements and approval process for third-party aggregators is vital to developing interest and timely response to this new program and the HECO Companies should include this information in the tariff. However, the present lack of clarity around third-party aggregator requirements should not delay the availability of the CGS+ option for customers. To the extent the HECO Companies require additional time to develop and propose telemetry and control requirements, the Companies are directed to submit proposed requirements in this docket, which shall be incorporated into the tariff upon approval. Furthermore, the tariff should clarify that the costs of a third-party aggregator will be borne by the customer.

Furthermore, the tariff should contain specific communication and control requirements. As proposed, Rule 24 does not provide details regarding communication and control features, stating that "the acceptable method(s) of implementing the Communication and Control requirements will be specified by the Company, consistent with the requirements of Decision and Order No. 34924 in Docket No. 2014-0192, and made publicly available on the Company's website." The Joint Parties, EFCA, and DERC all raise varying objections to this language.

The HECO Companies shall provide more specific details as to how the Communication and Control requirements will be implemented, consistent with D&O 34924, in the language of the tariff. Consistent with D&O 34924, the HECO Companies shall bear the cost of metering and control of a CGS+ customer's system for customers who choose the

non-aggregator option. As clarified above, for customers who elect a third-party aggregator, they will be responsible for the costs of contracting with the system aggregator.<sup>17</sup>

The commission also voiced concerns over the delays in implementing the CGS+ tariff, noting that "D&O 34924 was issued on October 20, 2017 . . . [and] [u]nder the circumstances, the commission is not inclined to delay implementation of the tariffs any longer."<sup>18</sup> However, "[t]hat being said, as discussed above, the commission is requiring certain modifications to these proposed tariffs, which will provide the HECO Companies with reasonable time to make these modifications and submit the final tariffs."<sup>19</sup> The HECO Companies were instructed to file a revised proposed tariff for Rule 24 within ten days of Order No. 35266, at which time it was intended to go into effect.<sup>20</sup>

Regarding Rule 25, the commission found that while "it [was] generally consistent with D&O 34924," certain modifications were required, including: (1) energy compensation rates for the neighbor islands; (2) clarification regarding the telemetry and control requirements for the tariff, specifically

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<sup>17</sup>Order No. 35266 at 11-13 (internal citations omitted).

<sup>18</sup>Order No. 35266 at 14-15.

<sup>19</sup>Order No. 35266 at 15.

<sup>20</sup>Order No. 35266 at 15.

the removal of any requirement providing for controllability or smart production meters; and (3) miscellaneous typographical corrections, including the effective date.<sup>21</sup>

Order No. 35266 also addressed the HECO Companies' proposed NEM policy and procedure and declined to approve the Companies' proposal submitted on November 21, 2017. In particular, the commission noted that further clarification was needed regarding both the HECO Companies' calculations of NEM "program size" and the HECO Companies' proposed compliance procedures.<sup>22</sup> In sum, the commission found that "[f]urther clarification is required, including, but not limited to, specific steps for enforcing compliance, measuring system exports, processing interconnection reviews, providing timely and transparent notice to customers, and developing a policy for upgrading legacy inverters."<sup>23</sup> As a result, the commission instructed the HECO Companies to continue discussing these issues with the Parties and re-submit their proposed NEM policy and procedure within thirty days of Order No. 35266.<sup>24</sup>

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<sup>21</sup>See Order No. 35266 at 16-17.

<sup>22</sup>Order No. 35266 at 18-19.

<sup>23</sup>Order No. 35266 at 21.

<sup>24</sup>Order No. 35266 at 22.

On February 20, 2018, the HECO Companies submitted, in relevant part, their revised Rule 24 and 25 tariffs, pursuant to Order No. 35266, at which time the tariffs took effect.<sup>25</sup>

On March 9, 2018, the HECO Companies submitted their Revised NEM Policy Proposal, pursuant to Order No. 35266.

In response to the February CGS+ Tariff, February SE Tariff, and Revised NEM Policy Proposal, the commission issued Order No. 35369 on March 28, 2018, in which the commission "observes that several issues remain that require immediate attention and resolution."<sup>26</sup> Specifically, regarding the February CGS+ Tariff, the commission stated:

The HECO Companies' "Communications and Controllability" section of Rule 24, while providing general details for communication and control features requirements, does not appear to have resolved the ambiguity and uncertainty present with that of the former, proposed "Communications and Controllability" provision. Indeed, the commission notes that critical details pertaining to the

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<sup>25</sup>Letter From: D. Brown To: Commission Re: Docket No. 2014-0192 - Instituting a Proceeding to Investigate Distributed Energy Resource Policies; Hawaiian Electric Companies - Compliance Filing; Rule 14H, Customer Grid Supply Plus and Smart Export Tariff Sheets, filed February 20, 2018 ("February CGS+ Tariff" and "February SE Tariff," respectively). See also Order No. 35266 at 22-23 (Ordering Paragraph Nos. 2 and 3).

<sup>26</sup>Order No. 35369, "Addressing Further Technical Issues Pertaining to the Hawaiian Electric Company, Inc., Hawaii Electric Light Company, Inc. and Maui Electric Company, Limited's Tariffs Filed Pursuant to Decision and Order No. 34924," filed March 28, 2018 ("Order No. 35369"), at 9.

communications and controllability for CGS+ systems remain unspecified in Rule 24.

. . . . .  
The commission remains troubled by the lack of clarity from the Companies for assisting customers to understand how the communications and controllability features will be offered. The commission underscores the need to very clearly set forth the specific communications and controllability requirements within the tariff itself, such that customers can make an informed investment decision with little to no ambiguity around compliance with Rule 24.<sup>27</sup>

Furthermore, "[b]eyond the general lack of specificity offered regarding communication and controllability requirements, Rule 24 includes language that mischaracterizes a customer's obligations under the tariff."<sup>28</sup> Accordingly, the commission directed the HECO Companies "to revise the tariff so that it more accurately captures a customer's obligations under Rule 24, and reflects the fact that it is the separate smart production meter, or third-party aggregator solution, that is providing the communication control and interface, rather than the customer's generating facility itself."<sup>29</sup>

In addition, the commission noted that the HECO Companies' February CGS+ Tariff customer eligibility language

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<sup>27</sup>Order No. 35369 at 11-12.

<sup>28</sup>Order No. 35369 at 12-13.

<sup>29</sup>Order No. 35369 at 14.

"may be too narrowly construed," in that Rule 24's requirement of "acceptable telemetry interface" "may be particularly problematic for customers on neighbor islands and/or in rural communities whose location may prohibit adequate reception of the Companies' chosen cellular or comparable communications technology, and/or who may lack access to the specific telecommunications network selected by the Companies."<sup>30</sup> Accordingly, the commission instructed the HECO Companies to revise their February CGS+ Tariff to address the commission's concerns.<sup>31</sup>

The commission also reiterated its concerns regarding the estimated timeline for implementing the February CGS+ Tariff, stating:

The commission finds that the timeline outlined by the Companies needs to be accelerated in order to provide customers with a CGS+ program third-party aggregator communication and controllability option in the near term. To that end, the Companies are directed to develop interim option(s) to enable customers to utilize a third-party aggregator to provide communications and control capabilities described in D&O 34924. This capability shall be enabled no later than May 31, 2018. The commission reiterates the need for the Companies to collaborate with prospective third-party aggregators on the development of this capability.<sup>32</sup>

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<sup>30</sup>Order No. 35369 at 14-15.

<sup>31</sup>See Order No. 35369 at 15-16.

<sup>32</sup>Order No. 35369 at 16. On this issue, the commission noted its support of the HECO Companies' proposal to utilize the Demand Response Management System ("DRMS") as a potential long-term

Regarding the February SE Tariff, the commission observed that the revised tariff's "Communications" section still included disputable language regarding telemetry and control requirements that were inconsistent with D&O 34924.<sup>33</sup> As a result, the commission ordered "Section D, 'Communications'" of the February SE Tariff stricken, and instructed the HECO Companies to make "all necessary conforming changes to other sections of [the February SE Tariff] with this guidance."<sup>34</sup>

Additionally, regarding the Revised NEM Policy Proposal, the commission observed that "while the Companies have improved upon their original proposal, the commission still has lingering questions and concerns."<sup>35</sup> Noting that the HECO Companies had proposed a policy with varying NEM plus energy storage configurations, the commission expressed "concern[]" that the complexity of this proposed policy may be unnecessary and may inadvertently hinder the ability of NEM customers to add energy

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solution for integrating and enabling third-party aggregators in the CGS+ program, but noted that this was not suitable to address the interim, near-term needs, given that the DRMS is not scheduled to go live until November 2018 at the earliest. Id. at 17.

<sup>33</sup>See Order No. 35369 at 17-19.

<sup>34</sup>Order No. 35369 at 19.

<sup>35</sup>Order No. 35369 at 19-20 (citations omitted).

storage systems."<sup>36</sup> In addition, the commission expressed concern with the proposed interconnection review process; calculation of "system size," "technical size," and "program size;" and the proposed "compliance" check related to kilo-watt hour ("kWh") export.<sup>37</sup>

Ultimately, the commission concluded that "[b]efore taking further action, the commission will provide the other Parties with the opportunity to submit additional comments regarding the Revised NEM Policy[,] with comments due no later than April 10, 2018."<sup>38</sup> Comments were subsequently filed by the Consumer Advocate, DERC, and EFCA, as well as a joint filing by HPVC, HSEA, and TASC (the "Solar Parties").<sup>39</sup>

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<sup>36</sup>Order No. 35369 at 20.

<sup>37</sup>Order No. 35369 at 20-21.

<sup>38</sup>Order No. 35369 at 21.

<sup>39</sup>"Division of Consumer Advocacy's Comments Regarding the Hawaiian Electric Companies' Revised Proposed NEM Policy Filed March 28, 2018," filed April 10, 2018 ("CA NEM Comments"); "Distributed Energy Resources Council of Hawaii's Comments on the Hawaiian Electric Companies' Revised Proposed Policy and Procedure for Adding to NEM Systems; and Certificate of Service," filed April 10, 2018 ("DERC NEM Comments"); Energy Freedom Coalition of America, LLC's Comments on the Hawaiian Electric Companies' Revised Proposed Policy and Procedure Implementing Commission's Ruling on Adding Non-Export Technology to NEM Systems, Filed March 9, 2018; and Certificate of Service," filed April 10, 2018 ("EFCA NEM Comments"); and "Comments on the HECO Companies' Revised Proposed Policy and Procedure for Adding to NEM Systems; Attachment A; and Certificate of Service," filed by HPVC, HSEA, and TASC on April 10, 2018 ("Solar Parties NEM Comments").



On April 9, 2018, the Joint Parties filed their Motion to Reaffirm. In response, on April 18, 2018, the HECO Companies filed an opposition to the Motion.<sup>40</sup> The Consumer Advocate also filed a response, and KIUC filed a statement of no position.<sup>41</sup>

On April 30, 2018, pursuant to Order No. 35369, the HECO Companies filed, in pertinent part, their April CGS+ and SE Tariffs that addressed the communications and control and customer eligibility concerns raised by the commission in Order No. 35369.

On May 31, 2018, the HECO Companies submitted their May CGS+ Compliance Filing, which included additional provisions for third-party aggregators, in response to guidance provided in Order No. 35369.

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<sup>40</sup>"Hawaiian Electric Companies' Opposition to Motion to Reaffirm and Enforce Commission-Approved Interconnection and Queuing Policy Regarding Modifications to DER System Size; and Certificate of Service," filed April 18, 2018 ("HECO Opposition to Motion to Reaffirm").

<sup>41</sup>"Division of Consumer Advocacy's Response to Motion to Reaffirm and Enforce Commission-Approved Interconnection and Queuing Policy Regarding Modification to DER System Size," filed April 18, 2018 ("CA Response to Motion to Reaffirm"); and "Kauai Island Utility Cooperative's Response to Joint Parties' Motion to Reaffirm and Enforce Commission-Approved Interconnection and Queuing Policy Regarding Modifications to DER System Size; and Certificate of Service," filed April 17, 2018.

## II.

### DISCUSSION

#### A.

##### The HECO Companies' Revised Rule 25 (SE) Tariff

The commission previously found that the HECO Companies' proposed communications and control requirements contained in their February SE Tariff were inconsistent with D&O 34924, and directed the HECO Companies to strike Section "D" from their proposed tariff.<sup>42</sup> The HECO Companies' filed April SE Tariff deletes Section "D" and a corresponding Appendix I Section 8.e.<sup>43</sup> This adequately responds to the commission's directives in Order No. 35369. Accordingly, the proposed revisions to Rule 25, as reflected in the April SE Tariff, are approved.

#### B.

##### The HECO Companies' Revised Rule 24 (CGS+) Tariff

Upon reviewing the HECO Companies' April CGS+ Tariff and May CGS+ Compliance Filing, the commission finds them to be generally consistent with the commission's directives in Order No. 35369. For example, the HECO Companies have added language

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<sup>42</sup>Order 35369 at 19.

<sup>43</sup>HECO Compliance Filing Rule 24 and Rule 25 Tariffs and Appendix I Filed April 30, 2018, Sheet 48E and 48.1-E.

pertaining to communication and control requirements, customer eligibility and alternatives related to communications and control, and requirements for third-party aggregators.

That being said, the commission observes that many of the Parties raised concerns with the communication and control and third-party aggregator requirements in the HECO Companies' initial CGS+ tariff.<sup>44</sup> Accordingly, the commission will provide the Parties with an opportunity to submit comments on the HECO Companies' April CGS+ Tariff and May CGS+ Compliance Filing. Comments shall be filed within fifteen (15) days of the filing date of this Order.

Notwithstanding these on-going minor adjustments to the CGS+ tariff, Rule 24 remains in effect, pursuant to Order No. 35266.<sup>45</sup>

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<sup>44</sup>See DERC DER Comment; EFCA DER Comments; CA DER Comments; and Joint DER Comments.

<sup>45</sup>See Order No. 35266 at 23 (Ordering Paragraph 3).

C.

The HECO Companies' Revised Proposed NEM Policy And Procedure

1.

Parties And Positions

i.

The Consumer Advocate

On April 10, 2018, the Consumer Advocate provided comments regarding the HECO Companies' Revised NEM Policy Proposal. The Consumer Advocate does not offer any alternatives to the HECO Companies' Revised NEM Policy Proposal; however, the Consumer Advocate expresses varying levels of support and opposition to several of the HECO Companies' proposed features.

Allowing NEM customers to add non-export systems. The Consumer Advocate appreciates the HECO Companies' efforts to provide a "fast track" interconnection option for NEM customers.<sup>46</sup> However, the Consumer Advocate has concerns with the HECO Companies' proposed options that allow NEM customers to install non-export technology without upgrading the legacy inverters on the entire system.<sup>47</sup> The Consumer Advocate believes that allowing NEM customers to only upgrade the non-export portion

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<sup>46</sup>CA NEM Comments at 5.

<sup>47</sup>CA NEM Comments at 6.

of their system would be inconsistent with the commission's intent in this proceeding.<sup>48</sup>

**Monitoring and compliance.** The Consumer Advocate expresses concern that the HECO Companies intend to utilize the same monitoring and compliance approach utilized for CSS systems for non-export systems, despite the HECO Companies' acknowledgment that a "relatively large percentage" of CSS systems are non-compliant with the requirements of the CSS program.<sup>49</sup> The Consumer Advocate requests that the HECO Companies provide more information about why existing non-export systems are non-compliant and the extent to which they have remained non-compliant. More specifically, the Consumer Advocate recommends that the HECO Companies include the number and percentage of CSS systems and NEM+ non-export systems that are non-compliant as a part of their quarterly DER Technical Reports.<sup>50</sup> The Consumer Advocate suggests that the HECO Companies provide (1) the amount of time the systems have been non-compliant, (2) the reason(s) why the systems are non-compliant, and (3) aggregated or

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<sup>48</sup>See CA NEM Comments at 7-8.

<sup>49</sup>See CA NEM Comments at 9.

<sup>50</sup>CA NEM Comments at 9.

otherwise anonymized data regarding exports that illustrate the extent to which these systems are non-compliant.<sup>51</sup>

The HECO Companies' proposed review process. The Consumer Advocate recognizes that the HECO Companies offer the Revised NEM Policy Proposal on an interim basis to allow time for the non-export technology to mature, and do not intend to revise Rule 14H at this time to reflect changes related to this policy.<sup>52</sup> However, the Consumer Advocate believes that the lack of clarity regarding what rules and conditions will apply to non-export systems may lead to confusion by customers, the solar industry, and the HECO Companies.<sup>53</sup> As such, the Consumer Advocate recommends that the HECO Companies consider revising Rule 18 (NEM) to include the addition of non-export systems and information regarding how those systems will operate (e.g., on inadvertent export).<sup>54</sup>

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<sup>51</sup>CA NEM Comments at 9.

<sup>52</sup>CA NEM Comments at 10.

<sup>53</sup>CA NEM Comments at 10.

<sup>54</sup>CA NEM Comments at 10.

ii.

DERC

On April 10, 2018, DERC filed comments regarding the HECO Companies' Revised NEM Policy Proposal. Similar to the Consumer Advocate, DERC expresses several concerns related to the HECO Companies' Revised NEM Policy Proposal. Specifically, DERC has concerns about the following issues: (1) limits on commercial NEM systems adding additional capacity as non-exporting technology, (2) the inverter replacement process for NEM systems, and (3) the HECO Companies' plan to encourage the activation of the volt-watt function before the commission has fully reviewed the issue of volt-watt.<sup>55</sup>

**Commercial NEM system limits.** DERC believes that the HECO Companies' proposed limits on commercial installations contradict the commission's guidance on how non-exporting technology should be accounted for when adding non-export systems to existing NEM systems.<sup>56</sup> DERC contends that a commercial system of any size up to 100 kW should be able to add non-exporting technology to serve behind the meter loads, so long as the kW output of the combined system remains the same.<sup>57</sup> DERC agrees

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<sup>55</sup>DERC NEM Comments at 2.

<sup>56</sup>DERC NEM Comments at 3.

<sup>57</sup>See DERC NEM Comments at 4.

that it is possible that an addition of non-exporting technology could result in an increase in the amount of kWh exported; however, DERC states that load profiles for commercial system vary greatly, and it is difficult to make generalizations regarding exports that will apply broadly.<sup>58</sup> DERC further states that the key metric the HECO Companies should consider is whether the total kW export of the combined system has changed, not whether the kWh export has changed.<sup>59</sup> Therefore, DERC "seeks confirmation" that a NEM customer with a commercial system should be able to add non-export technology of any size provided that the original kW system size does not increase and that the NEM system with the new non-exporting addition passes technical review.<sup>60</sup>

**Inverter replacement process for NEM systems.** DERC expresses concern that the HECO Companies' proposed rules regarding inverter replacement and add-ons to existing NEM systems present a possible contradiction and requests that the commission clarify and confirm that updated NEM systems will be allowed a variance of up to 1 kW, as currently allowed for standard system upgrades and repairs, when updating an existing NEM system with

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<sup>58</sup>DERC NEM Comments at 4.

<sup>59</sup>DERC NEM Comments at 4.

<sup>60</sup>DERC NEM Comments at 4.



advanced inverters.<sup>61</sup> DERC explains that the overall power output of existing NEM systems may be inadvertently increased depending on the design of replacement inverters and the associated power outputs.<sup>62</sup> Accordingly, DERC seeks clarification regarding this 1 kW variance in order to "avoid confusion and possible contradiction of the proposed rules[.]"<sup>63</sup>

**Activation of volt-watt function.** DERC is concerned about the HECO Companies' statement that they will "encourage" customers to activate volt-watt and/or volt-VAR.<sup>64</sup> DERC believes that the commission set a clear expectation that the activation of volt-watt into interconnection standards and/or grid services protocols will be considered in the upcoming market track of the DER docket.<sup>65</sup> Accordingly, DERC "questions the [HECO] Companies' continued interest in making the activation of volt-watt part of the conditions of interconnection," and maintains that "the activation of volt-watt should not be promoted . . . until all

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<sup>61</sup>DERC NEM Comments at 5-6.

<sup>62</sup>DERC NEM Comments at 5.

<sup>63</sup>DERC NEM Comments at 6.

<sup>64</sup>DERC NEM Comments at 6.

<sup>65</sup>DERC NEM Comments at 6.

parties have had a chance to fully consider the matter in the market track of this docket."<sup>66</sup>

iii.

EFCA

On April 10, 2018 EFCA filed comments and feedback regarding HECO's Revised NEM Policy Proposal. Overall, EFCA believes that the HECO Companies' Revised NEM Policy Proposal is a step in the right direction; however, as submitted, the Proposal imposes significant transaction costs that will act as a deterrent to many customers considering adding non-export systems, including energy storage.<sup>67</sup> In particular, EFCA states that requiring NEM customers to "upgrade the inverters of legacy NEM systems to meet prevailing advanced inverter requirements . . . will dramatically increase the cost of deploying a non-exporting system and likely deter many customers from doing do."<sup>68</sup>

**Advanced inverter functionality upgrade.** EFCA is concerned that the HECO Companies' requirement for NEM customers to upgrade the inverters of legacy NEM systems when adding a non-export system, will deter many customers from deploying a

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<sup>66</sup>DERC NEM Comments at 6-7.

<sup>67</sup>See EFCA NEM Comments at 2-3.

<sup>68</sup>EFCA NEM Comments at 3.

non-export system.<sup>69</sup> EFCA states that the cost of replacing an existing inverter is "substantial," and provides an estimate of \$1,500 for an average inverter upgrade for a 10 kW system.<sup>70</sup>

EFCA also contends that this requirement may also create additional complexity to the customer. For instance, if the original NEM system was deployed by a different contractor, the customer could be at risk of violating the warranty of an existing system and increase the responsibilities of the entity contracted to install the new non-exporting system to address any performance issues associated with the legacy system.<sup>71</sup>

EFCA is also concerned with the permitting issues that may be triggered upon replacement of inverters. For example, EFCA states that customer may have to re-permit the existing system so that the new hardware is consistently documented across city and county records and the interconnection agreement.<sup>72</sup>

For all these reasons, EFCA recommends eliminating this requirement altogether.<sup>73</sup> However, in the alternative, EFCA submits that if the commission decides to proceed with the

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<sup>69</sup>EFCA NEM Comments at 4.

<sup>70</sup>See EFCA NEM Comments at 4-5.

<sup>71</sup>EFCA NEM Comments at 5.

<sup>72</sup>EFCA NEM Comments at 5.

<sup>73</sup>EFCA NEM Comments at 6.

advanced inverter upgrade requirement, the commission should consider providing an exemption from this requirement in specific instances.<sup>74</sup>

Regarding possible criteria to craft exemptions from this requirement, EFCA offers the following options for consideration: (1) the existing inverter is less than 5 years old, (2) the cost of replacing the existing inverter exceeds \$1,000, (3) replacement of the existing inverter would void the warranty for the legacy NEM system, or (4) replacement of the existing inverter would require the existing system to be re-permitted.<sup>75</sup>

**Expanding eligibility to pursue "Residential Option 2."**

EFCA argues that the HECO Companies should modify their Revised NEM Policy Proposal in the following ways: (1) eliminate the requirement for a full technical review for systems larger than 10 kW; or (2) expand the eligibility for "Residential Option 2" to allow systems up to 20 kW in size.<sup>76</sup>

**Technical size limits for larger systems.** EFCA states that the HECO Companies' Revised NEM Policy Proposal "offers no pathway by which a customer can deploy a non-exporting system to an existing NEM facility if the addition of the non-export system

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<sup>74</sup>See EFCA NEM Comments at 3.

<sup>75</sup>EFCA NEM Comments at 6.

<sup>76</sup>See EFCA NEM Comments at 7-8.

increases the 'technical size' of the combined facilities beyond 100 kW."<sup>77</sup> EFCA requests that the commission "direct HECO to modify its proposal for larger systems such that there is no technical size limit whereby the combined capacity of the existing NEM system and an additional non-export system must stay below 100 kW[,] "<sup>78</sup> arguing that "[t]his limitation appears unnecessary and except for the very tenuous rationale HECO offers, does not appear to advance any meaningful policy or practical interest."<sup>79</sup>

**Proposed approach to assess hosting capacity impacts.** EFCA states that the HECO Companies' proposed approach to assess the hosting capacity impacts of Residential Options 1 and 2<sup>80</sup> appear unduly conservative and will have a material impact on the ability of the distribution system to host additional systems.<sup>81</sup> EFCA recommends that the commission reject the HECO Companies' proposal, but provide an opportunity for the HECO Companies to present additional data regarding the load offset provided by

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<sup>77</sup>EFCA NEM Comments at 8.

<sup>78</sup>EFCA NEM Comments at 10.

<sup>79</sup>EFCA NEM Comments at 10.

<sup>80</sup>See the Revised NEM Policy Proposal at 4 ("Impacts will be assessed on the amount of export capacity from the NEM system plus an assumed 3 kW load offset.").

<sup>81</sup>See EFCA NEM Comments at 10.

non-export systems.<sup>82</sup> "In the absence of this information, EFCA believes that non-exporting systems should be deemed as having minimal impact on hosting capacity."<sup>83</sup>

iv.

The Solar Parties

The Solar Parties do not believe that any of the three options provided in the HECO Companies' Revised NEM Policy Proposal are likely to have sufficient appeal to encourage customers to install grid-connected technologies when updating their systems.<sup>84</sup> As such, the Solar Parties provide a separate stand-alone proposal with four different pathways to add non-exporting and additional generation to existing NEM systems. In addition, the Solar Parties also provided general modifications to the Revised NEM Policy Proposal for the commission's consideration.

**Emergency back-up system exemption.** The Solar Parties recommend broadening the "emergency back-up systems" in the Revised NEM Policy Proposal "to include circumstances where the customer is (a) installing only an energy storage system, i.e., no additional PV generation, and (b) agrees to limit the export of

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<sup>82</sup>EFCA NEM Comments at 10.

<sup>83</sup>EFCA NEM Comments at 11.

<sup>84</sup>Solar Parties NEM Comments at 2..

the combined NEM + storage system to the original NEM capacity at any given moment."<sup>85</sup> Additionally, the Solar Parties believe the approval process for the emergency back-up systems should be either: (1) the same as that required for emergency back-up generators, as specified in the Revised NEM Policy Proposal; or (2), "at most, the 'bypassed' review afforded systems under the current Option 1."<sup>86</sup>

**Residential option revisions.** The Solar Parties generally believe that the measures proposed in the HECO Companies' Revised NEM Policy Proposal are unnecessarily complex and restrictive.<sup>87</sup> As such, the Solar Parties contend that for all proposed options, among other things: (1) the kWh-based compliance measures should be eliminated; (2) attempts to steer customers toward the activation of volt-watt should be avoided; and (3) the calculation of system size in terms of interconnection, hosting capacity, and programmatic caps should be clarified in the near term.<sup>88</sup>

Regarding Residential Option 1, the Solar Parties state that the 3 kW export limit "should be relaxed to a limit of 1 kW

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<sup>85</sup>Solar Parties NEM Comments at 2-3.

<sup>86</sup>Solar Parties NEM Comments at 3.

<sup>87</sup>Solar Parties NEM Comments at 3.

<sup>88</sup>Solar Parties NEM Comments at 3.

less than the original approved NEM system capacity, and the requirement to reprogram legacy inverters should include the qualification "when possible."<sup>89</sup> Regarding Residential Option 2, the Solar Parties argue that it should be revised to allow the same expedited review as a CSS system, as the HECO Companies have not provided a reasonable explanation as to why non-exporting technology should be treated any differently than CSS systems.<sup>90</sup> With regard to Option 3, the Solar Parties argue that this option should be eliminated, and that all NEM systems, regardless of size should be treated the same.<sup>91</sup> The Solar Parties contend that these revisions to the HECO Companies' Revised NEM Policy Proposal "will remove obstacles to customers' opportunities to add non-exporting systems to NEM[.]"<sup>92</sup>

Outside of the above proposed modifications, the Solar Parties recommend that the commission consider other options to add non-exporting technologies to existing NEM systems, and propose the following four additional options for commission consideration:<sup>93</sup>

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<sup>89</sup>Solar Parties NEM Comments at 3.

<sup>90</sup>Solar Parties NEM Comments at 3.

<sup>91</sup>Solar Parties NEM Comments at 3.

<sup>92</sup>Solar Parties NEM Comments at 4.

<sup>93</sup>See Solar Parties NEM Comments, Attachment A.



**Option A (Storage only):** Add energy storage (no new generation), limits exports to NEM approved kW threshold; notification only.

**Option B (Replace inverters):** Add non-exporting generation; replace inverters with advanced functionality; limit export to NEM approved kW threshold; expedited review (same as CSS review).

**Option C (Reduce kW Export):** Add non-exporting generation; reduce NEM exports continuously by 1 kW; reprogram inverters to advanced functionality when available; expedited review (same as CSS review).

**Option D (Reduce kWh Export):** Add non-exporting generation; add additional energy storage that reduces net NEM exports; reprogram existing inverters to advanced functionality when available; expedited review (same as CSS review).

2.

NEM Non-Exporting System Options

Upon review of the Parties' submissions and the record in this proceeding, the commission approves the HECO Companies' Revised NEM Policy Proposal, subject to the following modifications to simplify the options and provide greater flexibility to NEM customers who may be interested in adding non-export systems while remaining connected to the grid. The modifications to each of the HECO Companies' proposed options are discussed in further detail below. Briefly, the commission approves two broad options for adding non-exporting systems to

existing NEM systems, including: (1) NEM+; and (2) energy storage system additions.

Notwithstanding the commission's approval of this policy, the commission clarifies that any proposed changes in the future will require commission approval.

i.

NEM+

The standard NEM+ option combines the essential features of the HECO Companies' proposed "Residential Option 2" and "Larger Systems/Commercial Option: 100 kW Technical Size Limit," but clarifies that it is open to both residential and commercial customers and removes the proposed 100 kW limit on "total technical size."<sup>94</sup>

The HECO Companies have not provided sufficient justification to limit NEM+ solely to residential customers, nor for the proposed requirement that the original NEM system capacity be 10 kW or less. Thus, the commission will impose a 100 kW limit on the generation size of the customer's non-export addition, consistent with the requirements of the CSS program. This will allow both larger residential NEM systems and medium-sized commercial NEM systems to add non-exporting

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<sup>94</sup>See Revised NEM Policy Proposal at 4.

technology subject to a standard technical review for non-exporting systems.

Consistent with the commission's prior decisions, the total export capability must be limited to the size of the original NEM system. The commission declines to adopt the HECO Companies' proposed requirement regarding "total technical size" because it may prohibit certain NEM customers with larger systems from being able to utilize this option, especially customers who want to add energy storage.<sup>95</sup> This is inconsistent with the commission's guidance that "NEM customers should be able to install non-export technology and enroll in grid-connected energy storage programs that do not increase a system's export capacity, such as CSS."<sup>96</sup>

In sum, the HECO Companies do not sufficiently justify the need to subject NEM+ systems to a more stringent interconnection review than what is applied to other non-exporting systems, in particular CSS systems. Accordingly, the commission declines to adopt the HECO Companies' proposal to utilize Screens 2, 3, 5, 6, and 7 for technical review. Rather, the NEM+ systems shall be subject to the same review as is required for the

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<sup>95</sup>See e.g., EFCA NEM Comments at 9-10; and DERC NEM Comments at 4.

<sup>96</sup>D&O 34924 at 174.

CSS program. This is consistent with the commission's prior guidance that "NEM customers should be able to install non-export technology and enroll in grid-connected energy storage programs that do not increase a system's export capacity, such as CSS."<sup>97</sup> Unless otherwise ordered by the commission, NEM+ systems shall be subject to the same interconnection review as the CSS program.

In addition, the commission approves the HECO Companies' proposal that NEM+ customers must ensure that their non-export addition complies with current advanced inverter requirements. However, regarding the requirement that NEM customers who wish to add non-export energy systems must upgrade their legacy inverters,<sup>98</sup> a number of Parties have argued that requiring NEM customers who wish to add non-export energy storage systems to upgrade their legacy inverters will likely be "cost prohibitive."<sup>99</sup> At this juncture, the commission takes the opportunity to note that the Parties now advocating such concerns were among the very same Parties who initially proposed the idea of a legacy inverter upgrade as a quid pro quo for adding non-export energy storage to an existing NEM system.<sup>100</sup>

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<sup>97</sup>D&O 34924 at 174.

<sup>98</sup>See D&O 34924 at 175.

<sup>99</sup>See Solar Parties NEM Comments at 6-8.

<sup>100</sup>See "Blue Planet Foundation's, Hawaii PV Coalition's, Hawaii Solar Energy Association's, Life of the Land's, Puna Pono Alliance's, Ron Hooson's, The Alliance for Solar Choice's, and

Nonetheless, the commission acknowledges the concerns now raised by the Parties who originally proposed the legacy inverter upgrade requirement and, given that any NEM+ additions are required to be non-exporting, the commission finds it reasonable to waive the legacy inverter upgrade requirement for the NEM+ option. Thus, the commission will not require the existing NEM system inverter to be upgraded or replaced to comply with current advanced inverter requirements. Instead, the existing NEM system inverter must be re-programmed or updated to activate the voltage and frequency ride through and frequency-watt functions, per the latest advanced inverter requirements, where such updating or re-programming is possible. According to the HECO Companies, such re-programming should be feasible for many legacy systems.<sup>101</sup>

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Ulupono Initiative LLC's Initial Statement of Position on Deferred Issues and Technical Track Issues; Exhibits A, B, and C; Declaration of Bradford Copithorne; and Certificate of Service," filed August 14, 2017, at 11.

<sup>101</sup>See Revised NEM Policy Proposal at 3.

Energy Storage System Additions

The commission also approves an option for customers who wish to simply add an energy storage system to an existing NEM system, but do not add any generating capacity. This is similar to the HECO Companies' proposed exception "in cases where NEM customers request to add storage for emergency back-up purposes only;"<sup>102</sup> however, the energy storage addition need not be limited to emergency back-up purposes only. For this option, the commission requires the energy system addition to be registered with the utility, but the energy storage addition does not require technical review. As with the NEM+ option, export must be limited to the original NEM system capacity or less.

The commission's rulings on adding non-exporting systems to existing NEM systems are summarized in the table below:

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<sup>102</sup>Revised NEM Policy Proposal at 5.

Option	Technical Review Needed / Screens Required	Inverter Requirements	System Considerations and Requirements
NEM+	CSS review.	<p>Update NEM system to activate advanced inverter functions where possible, particularly voltage and frequency ride-through and frequency-watt.</p> <p>Non-export addition use advanced inverter(s) (if applicable).</p>	<p>Limit export to original NEM system capacity or less.</p> <p>Non-export system size must be 100 kW or less.</p>
Energy Storage Only	Bypass technical review, completeness review only.	Update NEM system to activate advanced inverter functions where possible, particularly voltage and frequency ride-through and frequency-watt.	Limit export to original NEM system capacity or less.

### 3.

#### Additional NEM Plus Non-Exporting System Policy Issues

### i.

#### Inverter Output Rating For All Program Options

DERC argues that in the process of replacing NEM inverters, the overall power output of the updated NEM system may be inadvertently increased "due the potential slight

variations in power outputs of replacement inverters."<sup>103</sup>

DERC explains:

This may occur because the replacement inverters that are designed to meet the SRD 1.1 requirements may have slightly larger power outputs. Differences will vary by manufacturer, but it would not be unusual for an updated inverter from the same manufacturer to change the power output from 200 watts/microinverter to 230 watts/microinverter.<sup>104</sup>

DERC recommends that a 1 kW variance should be allowed when customers update their existing NEM systems with advanced inverters.<sup>105</sup>

The commission notes that the HECO Companies' proposal does not specify a requirement for total rated power or individual rated power for replacement advanced inverters. Accordingly, the commission finds that DERC's proposal to allow for a 1 kW variance in rated power for advanced inverters is reasonable and should be approved. The HECO Companies shall include a section in their Revised NEM Proposed Policy to specify that advanced inverter replacements can be of greater size (rated capability) than the original NEM inverter as long as the new advanced inverter is programmed so that rated power output is limited to the original

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<sup>103</sup>DERC NEM Comments at 5.

<sup>104</sup>DERC NEM Comments at 5.

<sup>105</sup>See DERC NEM Comments at 6.



NEM inverter's programmed or maximum rated power output. This is consistent with the commission's ruling on the Joint Parties' Motion to Reaffirm (discussed below).

ii.

Application Process And Interconnection Review Process

The HECO Companies shall modify their proposed "Amendment to Existing Agreement Form" to accommodate the commission's modifications to the Revised NEM Policy Proposal options discussed above.<sup>106</sup>

In addition, language in the third paragraph presented in the "Proposed Application Process"<sup>107</sup> does not resolve concern about ambiguity around treatment and calculation of system size, technical size, and program size.<sup>108</sup> Accordingly, the HECO Companies shall collaborate with the Parties to propose definitions of system size, technical size, and program size by citing how each is calculated and how each is treated in the context of an interconnection review.

Within thirty (30) days of this Order, the HECO Companies shall draft and circulate proposed definitions to the Parties.

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<sup>106</sup>See Revised NEM Policy Proposal, Attachment 1.

<sup>107</sup>See Revised NEM Policy Proposal at 6.

<sup>108</sup>See Order No. 35369 at 20-21.

Thereafter, the HECO Companies and the other Parties shall meet to discuss the proposed definitions. This meeting shall take place within fifteen (15) days after the Companies circulate the proposed definitions to the Parties. Following the meeting with the Parties, the HECO Companies shall incorporate any feedback from the Parties and submit the proposed definitions to the commission within fifteen (15) days of meeting with the Parties. Thereafter, the Parties will have ten (10) days to submit comments on the HECO Companies' proposed definitions.<sup>109</sup>

This will provide an opportunity to establish a transparent, consistent set of working definitions and terms for the HECO Companies' DER tariffs. In the past, there has been confusion and delay arising from the interchangeable use of various terms such as "program size," "system size," and "technical size." In order to avoid confusion in the future, especially as discussion on DER tariffs becomes increasingly detailed and sophisticated, it is critical that the Parties operate with a common understanding regarding terminology. This may also help in avoiding delays and

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<sup>109</sup>Several of the Parties have suggested a workshop to address this issue, and the commission observes that this meeting could be combined with the commission's directive, below, regarding similar collaboration on drafting tariff language clarifying the treatment and tolerance level for modifications to interconnection applications for DER programs. See Section II.D.4, infra.

disputes over specific tariff language, to the extent confusion over a specific term results in misunderstanding.

Regarding the HECO Companies' proposed hosting capacity calculation for NEM system non-export additions, there is no clear evidence in the record at this time that justifies the proposed 3 kW load offset estimate. As a result, the commission does not approve the proposed hosting capacity calculation for NEM system non-export additions. The HECO Companies should further discuss this issue with the Parties in the context of the definitions of program size, system size, and technical size, as described in this Order.

iii.

#### Proposed Enforcement And Monitoring Process

The commission finds the "Proposed Enforcement and Monitoring Process" in the Revised NEM Policy Proposal<sup>110</sup> reasonable, with the exception of the kWh "compliance" check. While the commission is supportive of the HECO Companies' performance monitoring (including monitoring of kWh export), NEM+ systems should not be subject to a "compliance" check based

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<sup>110</sup>Revised NEM Policy Proposal at 6-8.

upon potential increased energy export, which may be an inherent part of adding non-export technology to existing NEM systems.<sup>111</sup>

Nevertheless, the commission acknowledges the Consumer Advocate's concerns related to "non-compliant" CSS systems.<sup>112</sup> The commission agrees that the HECO Companies should monitor and report on the performance of CSS and NEM+ systems in the quarterly DER Technical Reports.<sup>113</sup> As such, the HECO Companies shall work with the Consumer Advocate and commission staff to incorporate such information in the next quarterly DER Technical Report.

D.

The Joint Parties' Motion To Reaffirm

1.

The Joint Parties

On April 9, 2018, the Joint Parties filed their Motion to reaffirm and enforce a commission-approved interconnection and queuing policy regarding modifications to DER system sizes. The Motion to Reaffirm was filed in response to the HECO Companies' allegedly unilateral decision to replace the "1 kW Rule"

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<sup>111</sup>See Order No. 35369 at 21.

<sup>112</sup>See CA NEM Comments at 9.

<sup>113</sup>See D&O 34924 at 148-149.

(under which certain DER customers could modify the size of their approved DER system by up to 1 kW without the need to submit a new application or lose their place in the interconnection queue) with a revised policy stating that any revision to CGS applications could not increase a system's capacity by more than 100 watts ("W").<sup>114</sup>

The Joint Parties state that sometime in late 2017, the HECO Companies' began to inform solar contractors that any revised CGS application that increased the capacity of a system by more than 100 W would be required to undergo a new technical review within the interconnection process.<sup>115</sup> The Joint Parties contend that the HECO Companies did not take the proper steps to adequately inform solar contractors and customers of this change, alleging that the HECO Companies announced this decision in the September 2017 issue of their "DER Connected" newsletter, which was provided to readers via a link in an email the HECO Companies sent on September 19, 2017.<sup>116</sup> The Joint Parties claim that the link to the newsletter no longer works and that the

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<sup>114</sup>See Motion to Reaffirm, Memorandum in Support at 2.

<sup>115</sup>See Motion to Reaffirm, Memorandum in Support at 3.

<sup>116</sup>Motion to Reaffirm, Memorandum in Support at 3.

newsletter itself appears to have been removed from the HECO Companies' website.<sup>117</sup>

The Joint Parties claim that the HECO Companies' new 100 W tolerance policy unfairly limits any customer who has built their system in reliance on the 1 kW Rule. Under the new 100 W tolerance policy, the customer would be forced to either: (1) wait for additional capacity to become available in the program, or (2) pay a contractor to physically remove portions of an already built system.<sup>118</sup> "The HECO Companies' new 100 W limit thus leaves any customer who has built his or her system in reliance on the 1 kW Rule in a bind if the system's capacity varies by more than 100 W but less than 1 kW from the size that was originally proposed and approved."<sup>119</sup> Due to changes in technology, the Joint Parties claim that "[h]undreds of CGS applicants have proposed installing technology that no longer exists[,]" which will necessitate changes that would otherwise have been permitted under the 1 kW Rule.<sup>120</sup> Similarly, the Joint Parties argue that "[b]ecause very few system modifications would result in a less

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<sup>117</sup>Motion to Reaffirm, Memorandum in Support at 3-4.

<sup>118</sup>Motion to Reaffirm, Memorandum in Support at 4.

<sup>119</sup>Motion to Reaffirm, Memorandum in Support at 4.

<sup>120</sup>Motion to Reaffirm, Memorandum in Support at 5.

than 100 W impact on a DER system's capacity, the new 100 W limit acts as an overbroad prohibition against modifications."<sup>121</sup>

The Joint Parties argue that "[g]iven that the HECO Companies have historically allowed changes of up to 1 kW, it was reasonable for customers to rely on this longstanding practice[,] and that "[b]ecause the HECO Companies applied the 1 kW Rule for years both prior and subsequent to Order No. 33559, it was reasonable for customers and contractors to rely on the rule."<sup>122</sup> The Joint Parties claim that if customers had been aware of this policy "change," they could have "at least attempted to submit revised applications before the CGS program became filled[,] or "take[n] proactive steps to revise their applications before building their systems."<sup>123</sup> As asserted by the Joint Parties, "[c]ustomers who reasonably relied on the 1 kW Rule should not be forced to choose between waiting in indefinite limbo and potentially losing their place in the CGS program, or paying up to thousands of dollars to reduce the size of a system that has already been built."<sup>124</sup>

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<sup>121</sup>Motion to Reaffirm, Memorandum in Support at 8.

<sup>122</sup>Motion to Reaffirm, Memorandum in Support at 4 and 9.

<sup>123</sup>Motion to Reaffirm, Memorandum in Support at 6-7.

<sup>124</sup>Motion to Reaffirm, Memorandum in Support at 9.

The Joint Parties maintain that the 1 kW Rule should apply to all DER applications, and request that the "[c]ommission [] reaffirm the 1 kW Rule as sound policy for all [c]ommission-approved DER programs[,] and "direct the HECO Companies to allow a customer to change the capacity of his or her system by up to 1 kW when there is a reasonable basis for the modification."<sup>125</sup> In support, the Joint Parties argue that "[e]liminating the flexibility of the 1 kW Rule creates an incentive for customers to submit applications for artificially sized systems to preserve the flexibility to adjust their system sizes if necessary and avoid the very problems that the HECO Companies are creating through their new 100 W limit."<sup>126</sup>

Alternatively, the Joint Parties request "if the 1 kW Rule is discontinued going forward, we respectfully request that the [c]ommission at least require the HECO Companies to apply the 1 kW Rule to customers who have already submitted applications for the CGS or CSS programs . . . ."<sup>127</sup>

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<sup>125</sup>Motion to Reaffirm, Memorandum in Support at 10.

<sup>126</sup>Motion to Reaffirm, Memorandum in Support at 7.

<sup>127</sup>Motion to Reaffirm, Memorandum in Support at 10.



The HECO Companies

On April 18, 2018, the HECO Companies filed their Opposition to the Joint Parties' Motion. The HECO Companies specifically object to the Joint Parties' Motion for the following reasons:

(1) [T]he Companies did not revoke the 1 kW Rule because the policy never applied to any DER program other than NEM; (2) Order No. 33559 is clearly and unambiguously limited to the NEM program; (3) the Joint Parties' Motion is legally defective; (4) the Joint Parties seek to unilaterally impose a new and unvetted Expanded 1 kW Rule across all DER programs without Commission approval; (5) the Joint Parties' Expanded 1 kW Rule is unnecessary; (6) the Joint Parties' Expanded 1 kW Rule is incompatible with [c]ommission-approved DER program capacity limits; (7) the Joint Parties' Expanded 1 kW Rule is detrimental to customers currently waiting in DER program queues; (8) the Motion is, in fact, an untimely and unsupported motion for reconsideration of Order No. 33559; and (9) the Joint Parties, and solar contractors in general, need to take responsibility for the accuracy of their applications.<sup>128</sup>

The HECO Companies maintain that "[t]he entire premise of the Joint Parties' Motion to Reaffirm is fundamentally flawed[,] as "the 1 kW Rule has never been applicable to any other DER program other than to pending applications in the NEM

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<sup>128</sup>HECO Opposition to Motion to Reaffirm at 3-4.

program."<sup>129</sup> Specifically, the HECO Companies state that the commission expressly limited the applicability of Order No. 33559 to pending NEM applications that were in the interconnection queue after October 12, 2015.<sup>130</sup> As such, the HECO Companies believe it is "not reasonable for the Joint Parties or anyone else to assume that Order No. 33559 extended the applicability of the 1 kW Rule to any DER program other than NEM[.]"<sup>131</sup> The HECO Companies state that "[i]f the Joint Parties wanted to impose such a broad policy across all DER programs, then this issue should have been raised by the Joint Parties in any of the numerous stakeholder meetings that have been conducted since the [c]ommission's issuance of Order No. 33559 over two years ago."<sup>132</sup>

The HECO Companies also believe that the Joint Parties' proposal is not compatible with commission-approved DER program capacity limits. The HECO Companies claim that under the Joint Parties' proposal the additional program capacity, in the aggregate, could be a significant accommodation given the number of DER applications that the HECO Companies are currently

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<sup>129</sup>HECO Opposition to Motion to Reaffirm at 6.

<sup>130</sup>HECO Opposition to Motion to Reaffirm at 6.

<sup>131</sup>HECO Opposition to Motion to Reaffirm at 8.

<sup>132</sup>HECO Opposition to Motion to Reaffirm at 9.

processing and anticipate receiving in the future.<sup>133</sup> The HECO Companies maintain that, consistent with the commission's directive, enrollment in DER programs is capped once program capacity is reached, and that additional capacity is not budgeted for PV systems that do not match their application, meaning that the 1 kW Rule, cumulatively, could result in fewer DER applications being accepted.<sup>134</sup>

In support of the modified 100 W policy, the HECO Companies represent that an acceptable variance of 100 W is sufficient "to account for nominal increases in system capacity due to a solar contractor's inability to install a NEM system in accordance with the application that was actually submitted," thus making the 1 kW Rule unnecessary.<sup>135</sup> The HECO Companies state that, to date, all applications for increased capacity have been processed for approval in accordance with the 100 W policy.<sup>136</sup> Furthermore, the HECO Companies note that the 100 W policy has always been the standard in the HELCO service territory and was expressly approved as reasonable for HELCO in Order No. 33559.<sup>137</sup>

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<sup>133</sup>HECO Opposition to Motion to Reaffirm at 12.

<sup>134</sup>See HECO Opposition to Motion to Reaffirm at 12.

<sup>135</sup>HECO Opposition to Motion to Reaffirm at 10-11.

<sup>136</sup>HECO Opposition to Motion to Reaffirm at 11.

<sup>137</sup>HECO Opposition to Motion to Reaffirm at 11.

Accordingly, the HECO Companies believe the 1 kW Rule should to be limited to the NEM program unless and until the Joint Parties properly demonstrate that the public interest requires an expansion of the policy.<sup>138</sup>

With regard to timeliness of the Joint Parties' Motion, the HECO Companies assert that the Joint Parties' Motion is an attempt to expand the scope and applicability of Order No. 33559, and, thus, constitutes an untimely request for reconsideration.<sup>139</sup> The HECO Companies argue that the Joint Parties could have sought timely clarification to Order No. 33559 pursuant to HAR § 6-61-137 at the time Order No. 33559 was issued. Alternatively, the HECO Companies argue that relief pursuant to Rule 60 of the Hawaii Rules of Civil Procedure ("HRCP") is inapplicable, as the Joint Parties' Motion fails to satisfy the criteria set forth in HRCP 60(b)(1)-(6).<sup>140</sup>

### 3.

#### The Consumer Advocate

On April 18, 2018, the Consumer Advocate provided its Response to the Joint Parties' Motion. The Consumer Advocate states

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<sup>138</sup>HECO Opposition to Motion to Reaffirm at 9.

<sup>139</sup>See HECO Opposition to Motion to Reaffirm at 12-13.

<sup>140</sup>HECO Opposition to Motion to Reaffirm at 13.

that "the [c]ommission was clear in Order No. 33559, that the 1 kW Rule was to be applied to only 'pending' NEM applications that were in the queue after October 12, 2015, and . . . the [c]ommission did not expand the applicability to all DER programs."<sup>141</sup> In addition, the Consumer Advocate believes that "the Joint Parties may be creating some confusion by asserting that customers will be harmed because they may need to pay 'up to thousands of dollars to reduce the size of a system that has already been built[,]'" given that "the 1 kW Rule should only be applied to pending NEM applications and the Consumer Advocate is unaware of the [c]ommission's intent to direct [the] [HECO] Companies to address circumstances where a NEM system has already been installed."<sup>142</sup>

In affirming that the 1 kW Rule should only be applied to pending NEM applications, the Consumer Advocate expresses concern that "the practice of allowing the described capacity increases has adverse effects for DER participants, non-participants, and the grid system as a whole."<sup>143</sup> For example, "allowing applicants or owners to increase capacity above that listed on their application will effectively limit the number of

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<sup>141</sup>CA Response to Motion to Reaffirm at 5.

<sup>142</sup>CA Response to Motion to Reaffirm at 7.

<sup>143</sup>CA Response to Motion to Reaffirm at 8.

additional customers in a given area who may participate in DER programs," and "[t]he practice also contributes to the oversizing of systems, resulting in or increasing the amount of unused excess energy credits, such as for CGS systems."<sup>144</sup> As such, the Consumer Advocate believes that before expanding the 1 kW Rule, "the [c]ommission should investigate whether such increases are in the public interest."<sup>145</sup>

Accordingly, the Consumer Advocate recommends that "[t]o the extent the [c]ommission is considering granting the Joint Parties' Motion, . . . the [c]ommission [should] consider additional steps to allow for the incorporation of terms and conditions in the [HECO] Companies' rules that will allow for minor changes in pending DER program applications."<sup>146</sup> The Consumer Advocate submits that the establishment of formal terms and conditions to address this issue may help "mitigate future confusion on how minor changes to pending DER applications might be applied" by providing "transparency and clarity to all customers, installers, etc."<sup>147</sup>

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<sup>144</sup>CA Response to Motion to Reaffirm at 8.

<sup>145</sup>CA Response to Motion to Reaffirm at 9.

<sup>146</sup>CA Response to Motion to Reaffirm at 10.

<sup>147</sup>CA Response to Motion to Reaffirm at 11; see also id. at 13.

Addressing The Joint Parties' Motion To Reaffirm

After reviewing the Parties' briefing and the record in this proceeding, the commission resolves the Joint Parties' Motion to Reaffirm as follows:

(1) The commission requires the HECO Companies to apply the 1 kW Rule to customers who have already submitted applications for the CGS or CSS programs, as well as for the CGS+ and SE programs, as applicable; and

(2) The commission instructs the HECO Companies to collaborate with the Parties to develop tariff language to explicitly clarify the treatment and tolerance level for modifications to interconnection applications for the CGS, CSS, CGS+, and SE programs on a going forward basis.

These rulings are consistent with both: (1) the commission's intent behind Order No. 33559; and (2) the commission's expectation for the HECO Companies' approach to stakeholder communication and engagement.

First, in Order No. 33559, the commission "acknowledge[d] the existence of the HECO Companies' policy of allowing minor system capacity alterations of up to 1 kW as an accommodation to solar contractors to avoid the need for them to submit multiple revised NEM applications prior to the installation of a PV system, and to ensure that systems are installed using the

most current equipment and appropriate configuration."<sup>148</sup>

In response to the Parties' dispute over whether this informal policy should continue to be applied to NEM applications, the commission stated:

[I]n an effort to resolve this matter, the commission concludes that there are, in certain circumstances, reasonable bases for customers to seek PV system capacity changes after their NEM application is filed, but before their system is installed, in order to achieve optimal system operation and efficiency. The commission finds it reasonable and in the public interest for the HECO Companies to continue to apply a tolerance level for minor system capacity expansions of less than or equal to 1 kW in situations where an applicant can demonstrate a reasonable basis for changing the PV system design or equipment.<sup>149</sup>

In reaching this ruling, the commission found that the continued application of the 1 kW Rule was not expected to result in a "sustained and significant increase in capacity under the existing NEM program," nor did it "create a 'vested right to install up to 1 kW of additional NEM capacity in the future over the life of the NEM contract.'"<sup>150</sup> However, the commission clarified that "[s]hould the commission find that this tolerance level is leading to a significant capacity expansion,

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<sup>148</sup>Order No. 33559 at 6.

<sup>149</sup>Order No. 33559 at 9.

<sup>150</sup>Order No. 33559 at 10.



the commission will revisit this issue and may revise or cap the tolerance level as necessary to protect the system grid."<sup>151</sup>

Turning to the situation at hand, while Order No. 33559 was issued in response to issues raised regarding the NEM program, the underlying policy and reasoning is applicable to other DER programs. The underlying technical considerations are analogous. A customer who seeks to install a CGS, CSS, CGS+, or SE system may encounter unexpected situations, including, but not limited to, "changes to the HECO Companies' qualified equipment list, switching contractors, non-availability of original equipment (and/or availability of more better [sic] equipment), roof alterations or changes in shading, improved analysis of home electricity use and the evolving equipment retirements of third-party system financing or leasing companies[,] "<sup>152</sup> that results in a difference in capacity (up to 1 kW) between their installed system and their original application. Thus, the commission is not persuaded that CGS, CSS, CGS+, and/or SE customers should be denied a similar opportunity, should specific circumstances arise that warrant such tolerance, to "demonstrate

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<sup>151</sup>Order No. 33559 at 10-11.

<sup>152</sup>Order No. 33559 at 6-7.

through a written letter to the HECO Companies a reasonable basis for a system capacity expansion of  $\leq 1$  kW[.]”<sup>153</sup>

Similarly, the commission previously found that the effects of the 1 kW Rule were unlikely to result in a “sustained and significant increase in capacity under the NEM program,” but left open the option of revisiting this issue “[s]hould the commission find that this tolerance level is leading to a significant capacity expansion[.]”<sup>154</sup> While originally contemplated as related to the NEM program, the underlying consideration should be extended to the CGS, CSS, CGS+, and SE programs in that, absent evidence that application of the 1 kW Rule is resulting in a sustained and significant increase in capacity to these programs, the Rule should be applied.

In addition, the HECO Companies have not provided a technical justification as to why the tolerance policy should be 100 W, nor have they provided additional information related to the review process of the 1 kW rule in its application to CGS and CSS systems. Absent such evidence, and given the considerations discussed above, the commission is not persuaded that a deviation from the Companies’ prior practice of applying the 1 kW Rule is justified under the present circumstances.

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<sup>153</sup>Order No. 33559 at 9.

<sup>154</sup>Order No. 33559 at 10-11.

Furthermore, in Order No. 33559, the commission "also direct[ed] the Companies to notify customers of the [1 kW] policy set forth in this Order in writing no. later than March 10, 2016, to attempt to alleviate any confusion the Companies' November 11[, 2015] Letter has caused."<sup>155</sup> According to the Joint Parties, regarding the present alleged rescission of the 1 kW Rule, the HECO Companies did not provide sufficient notification to solar installers,<sup>156</sup> resulting in a similar state of confusion. The commission emphasizes the importance of timely and open communication from the HECO Companies so as to minimize unnecessary disruptions in the marketplace and confusion surrounding DER programs.

Based on the above, and absent persuasive evidence that applying the 1 kW Rule to DER programs will result in a "sustained and significant increase in capacity" or other tangible risk to the HECO Companies' system, the commission finds that it is reasonable to allow such flexibility for CGS, CSS, CGS+, and SE customers seeking modifications to their systems, under the same

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<sup>155</sup>Order No. 33559 at 10. The "November 11, 2015 Letter" refers to a letter issued on November 11, 2015, by which "the HECO Companies rescinded the 1 kW Rule, except for conditionally approved NEM systems installed by November 11, 2015." Id. at 3.

<sup>156</sup>See Motion to Reaffirm, Affidavit of William Giese. Order No. 33559 was issued on February 26, 2016.

conditions set forth in Order No. 33559. Until further data can be provided for evaluation, the tolerance level in place is reasonable. However, as stated in Order No. 33559, should the commission later find that this tolerance level is leading to a significant capacity expansion, the commission will revisit this issue and may revise the tolerance level, as necessary.<sup>157</sup>

Second, the commission directs the HECO Companies to collaborate with the Parties to develop tariff language memorializing the tolerance level for DER systems on a going forward basis to: (1) allow an opportunity for the HECO Companies and other Parties to fully explain the technical or policy rationale for their respective positions on this issue; (2) ensure a more robust conversation among the Parties that results in an established, documented policy that is flexible, effective, and appropriately considers the continued integration of DER onto Hawaii's system; and (3) avoid future confusion on how minor changes to pending DER applications might be applied.

This is consistent with the Consumer Advocate's request to require that terms and conditions be incorporated into the HECO Companies' rules "to allow transparency and clarity to all customers, installers, etc."<sup>158</sup> Furthermore, this serves as a

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<sup>157</sup>See Order No. 33559 at 10-11.

<sup>158</sup>CA Response to Motion to Reaffirm at 11.

reminder to the HECO Companies that it is critical to collaborate with stakeholders in the development of policies and procedures in order to promote the smooth and open-minded development of innovative approaches to the integrating increasing levels of DER onto Hawaii's grid.

Accordingly, the commission directs the HECO Companies to draft and circulate proposed tariff language clarifying the treatment and tolerance level for modifications to interconnection applications for the CGS, CSS, CGS+, and SE tariffs within thirty (30) days of this Order. Thereafter, the HECO Companies shall meet with interested Parties regarding the proposed tariff language related to clarifying the treatment and tolerance level for modifications to interconnection applications for the CGS, CSS, CGS+ and SE tariffs within fifteen (15) days of circulating proposed tariff language to the Parties. At the meeting, the HECO Companies shall discuss the justification of their proposed language with the Parties, as well as any concerns the Parties may have.<sup>159</sup>

The HECO Companies shall incorporate any feedback from the Parties and submit proposed tariff language to the commission within fifteen (15) days of meeting with the Parties. Thereafter,

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<sup>159</sup>As noted, supra, this meeting can also address the proposed DER definitions. See Section II.3.ii.

the Parties will have ten (10) days to submit comments on the HECO Companies' proposed tariff language. While it is the commission's preference to continue to allow a reasonable tolerance for modifications to interconnection applications during the interconnection review process, assuming customers can demonstrate a reasonable basis for doing so, the commission remains open to reviewing any proposal from the HECO Companies and will weigh any justifications provided in support accordingly.

E.

Modifying The Procedural Schedule

As noted in this Order, following the issuance of D&O 34924, a number of issues have arisen relating to the implementation of the guidance and rulings therein. These include, but are not limited to: (1) finalizing the requirements and tariff language for Rule 24 (CGS+) and Rule 25 (SE); and (2) establishing a policy for the HECO Companies to permit the addition of non-export technology to existing NEM systems. These lingering issues continue to require the Parties' and commission's attention and resources following D&O 34924, and thus the commission believes it is prudent to resolve these issues before moving on to the new issues identified for the Market Track.<sup>160</sup> While this has delayed

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<sup>160</sup>See Order No. 34206 at 8-9.

the commencement of the Market Track, the commission observes that D&O 34924, in resolving the Technical Track issues, also addressed several issues that were originally intended for the Market Track (e.g., establishing new successor DER tariffs). As such, the time and effort expended to resolve the issues related to the Rule 24 (CGS+) and Rule 25 (SE) tariffs will ultimately benefit the discussion in the Market Track.

Accordingly, the commission, at this time, suspends the procedural schedule established in Order No. 34206, so as to avoid confusion and to allow the Parties to conserve their resources and focus their attention on the actions set forth in this Order. The commission will provide further guidance related to the scope and procedural steps of the Market Track by subsequent Order.

### III.

#### ORDERS

##### THE COMMISSION ORDERS:

1. The HECO Companies' April SE Tariff is approved. The HECO Companies shall submit a revised Rule 25 tariff reflecting the approved revisions in this Order. Upon filing, the revised Rule 25 tariff shall replace and supersede the existing Rule 25 tariff, filed on February 20, 2018.

2. The Parties may submit comments on the HECO Companies' May CGS+ Compliance Filing within fifteen (15) days of this Order.

3. The HECO Companies' Revised NEM Policy Proposal is approved, as modified above.

4. The Joint Parties' Motion to Reaffirm is granted, as set forth above. For the time being, the HECO Companies shall apply the 1 kW Rule to all CGS and CSS applicants, as well as CGS+ and SE applicants, as applicable. In the event the HECO Companies put forth convincing evidence that the 1 kW Rule is or will result in a "significant capacity expansion," the commission will revisit this issue.

5. Within thirty (30) days of this Order, the HECO Companies shall:

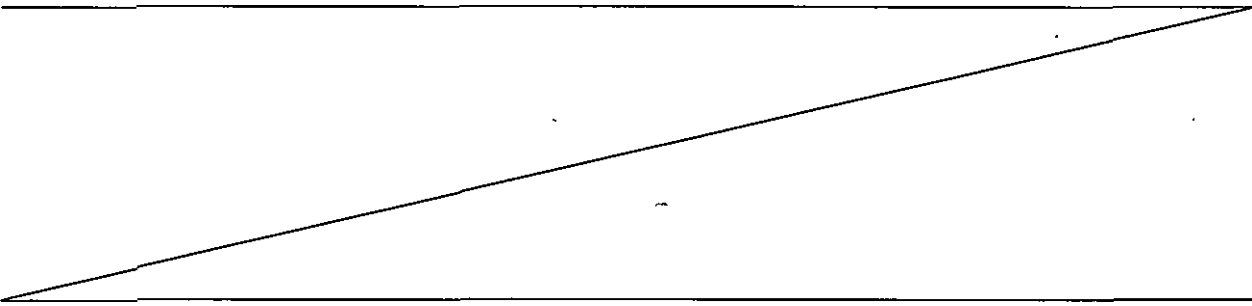
(A) Propose definitions of system size, technical size, and program size by citing how each is calculated and how each is treated in the context of an interconnection review. Thereafter, the Parties shall meet to discuss the proposed definitions. This meeting shall take place within fifteen (15) days after the HECO Companies circulate their proposed definitions. The HECO Companies shall incorporate any feedback from the Parties and submit the proposed definitions to the commission within fifteen (15) days of meeting with the Parties. The Parties may



submit comments on the HECO Companies' proposal to the commission within ten (10) days after the HECO Companies' submittal.

(B) Propose tariff language clarifying the treatment and tolerance level for modifications to interconnection applications for the CGS, CSS, CGS+, and SE tariffs. Within fifteen (15) days after the HECO Companies circulate their proposed tariff language, the HECO Companies shall meet with interested Parties regarding the proposed tariff language. The HECO Companies shall submit proposed tariff language clarifying the treatment and tolerance level for modifications to interconnection applications for the CGS, CSS, CGS+, and SE tariffs to the commission within fifteen (15) days of meeting with the Parties. The Parties may submit comments on the HECO Companies' proposal to the commission within ten (10) days after the HECO Companies' submittal.

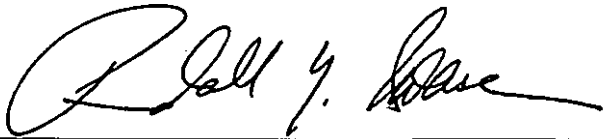
(C) The meetings discussed in subsections (A) and (B), above, may be held jointly, and the corresponding submittals may be combined into a single submittal. Likewise, the Parties' comments on the HECO Companies' submittals set forth in subsections (A) and (B) may be combined and filed jointly.



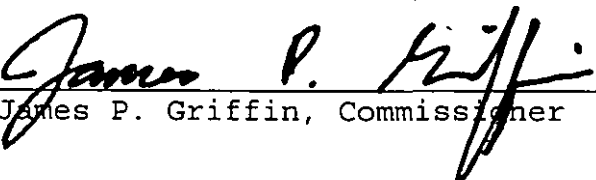
6. The procedural schedule governing the Market Track of Phase 2, set forth in Order No. 34206, is suspended. The commission will issue further instructions regarding modifications to the Procedural Schedule in a subsequent Order.

DONE at Honolulu, Hawaii JUN 29 2018


PUBLIC UTILITIES COMMISSION  
OF THE STATE OF HAWAII

By   
Randall Y. Iwase, Chair

By   
Lorraine H. Akiba, Commissioner

By   
James P. Griffin, Commissioner

APPROVED AS TO FORM:

  
Mark Kaetsu  
Commission Counsel

2014-0192.ljk

CERTIFICATE OF SERVICE

The foregoing order was served on the date of filing by mail,  
postage prepaid, and properly addressed to the following parties:

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